

Fig.1

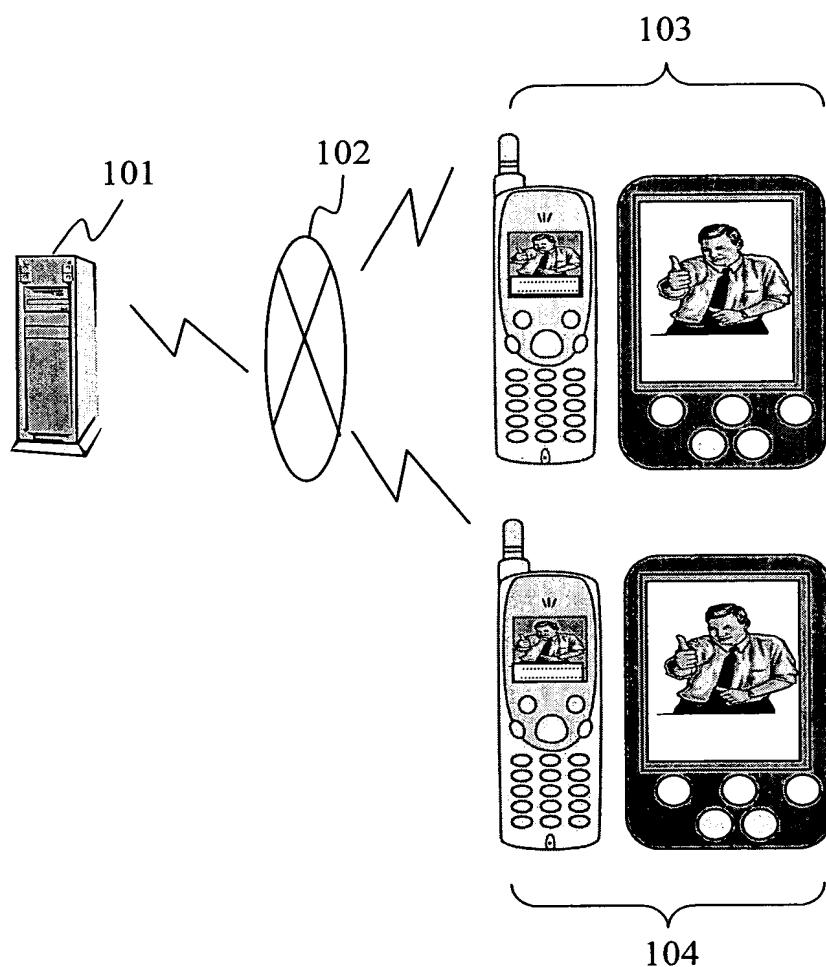


Fig.2

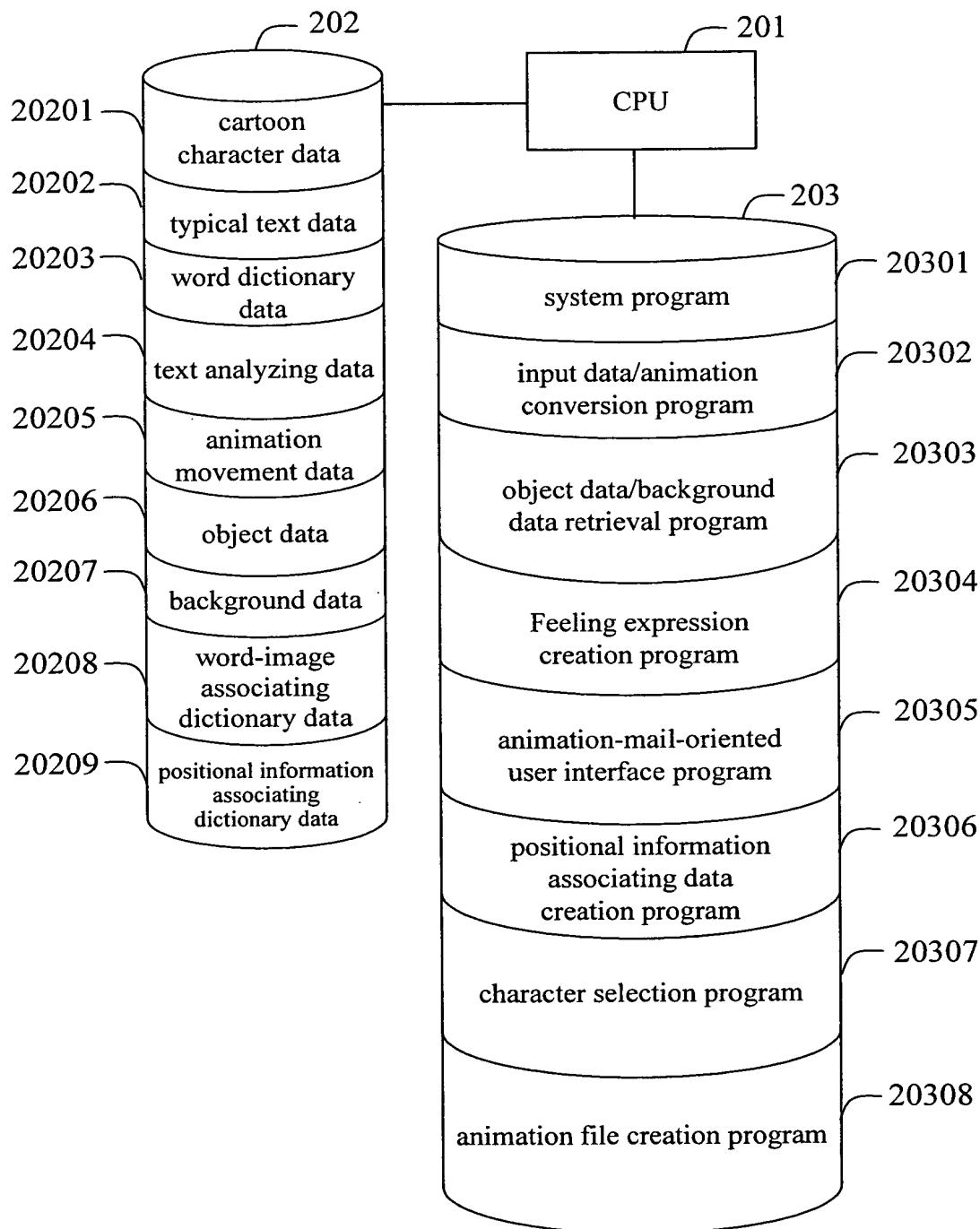


Fig.3

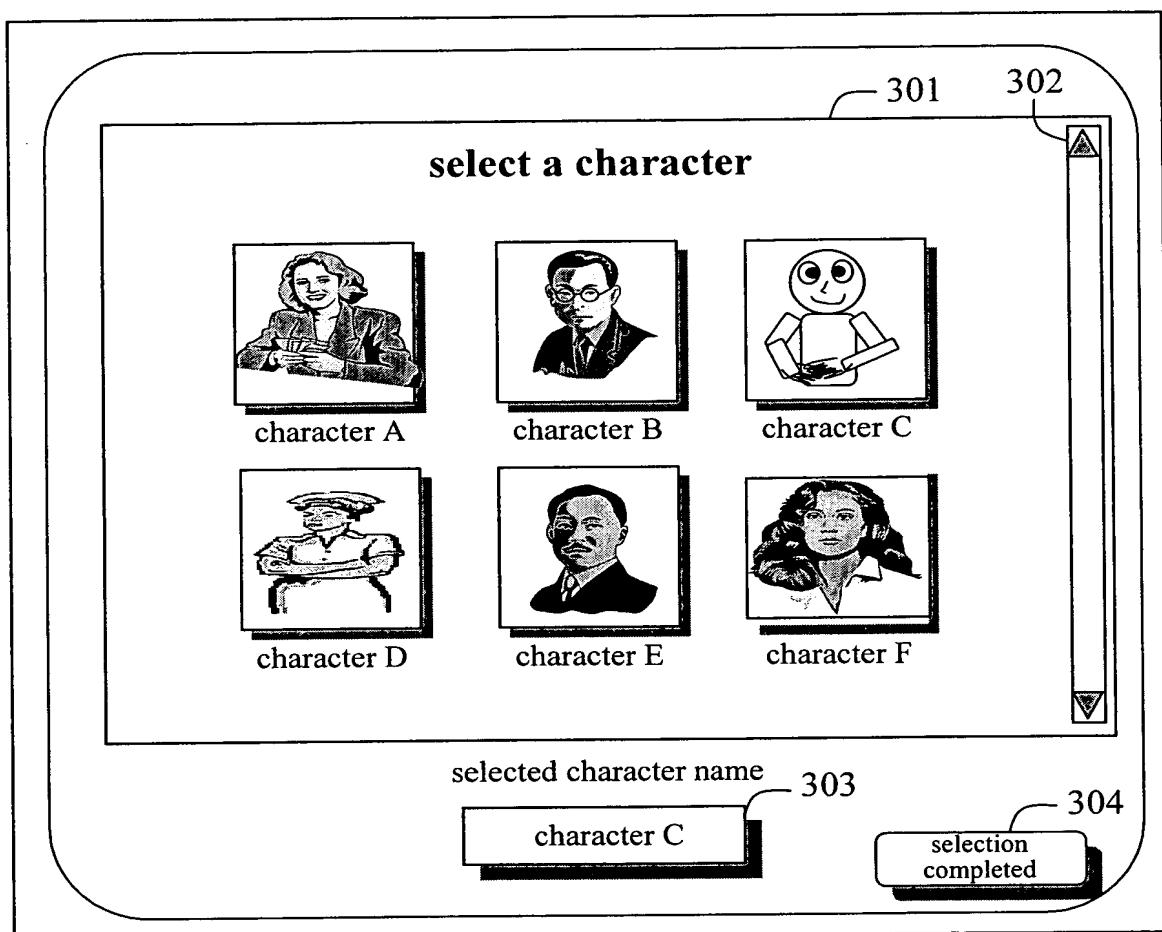


Fig.4

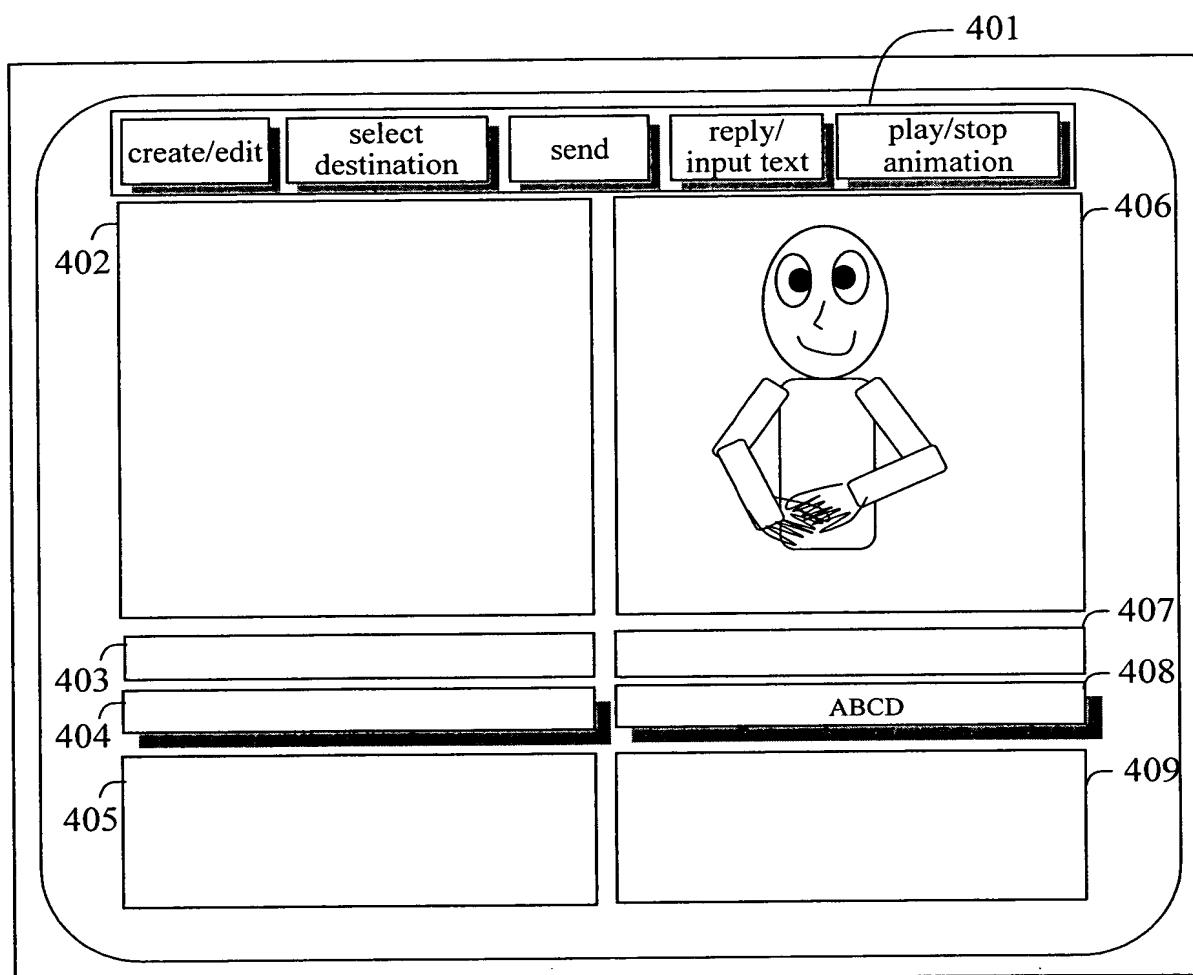


Fig.5

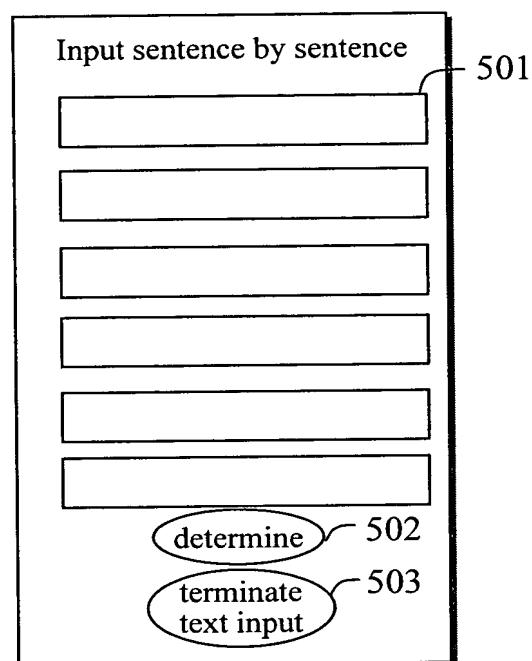


Fig.6

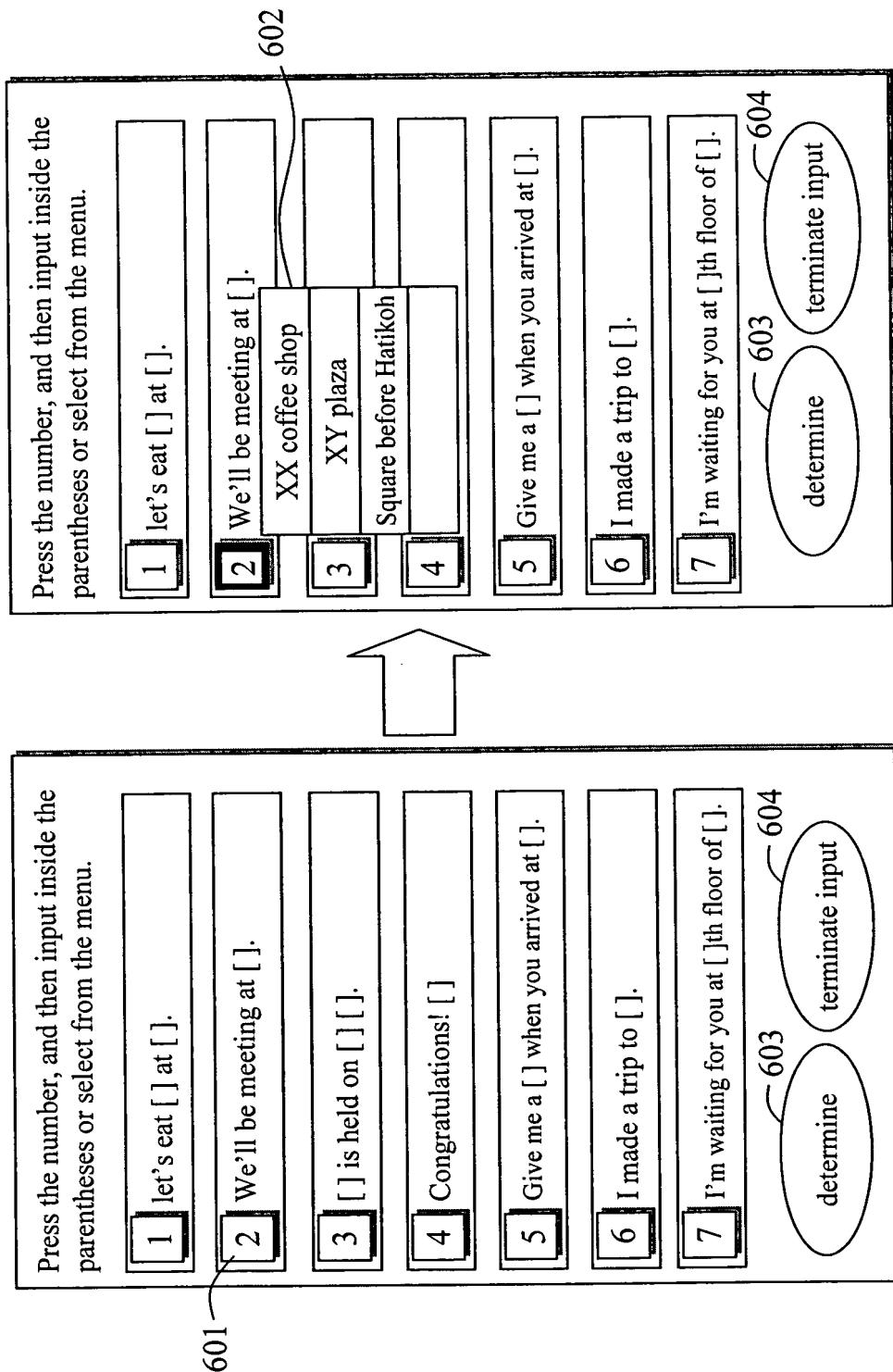


Fig.7

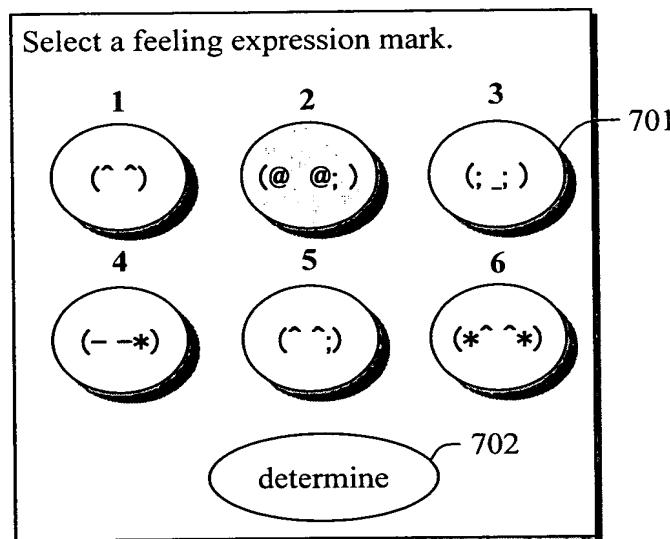


Fig.8

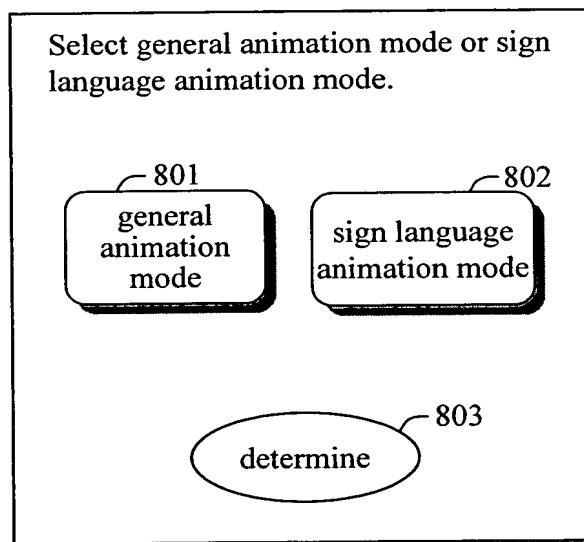


Fig.9

category name	word number 902	1 901	2	3	4	
Place (fixed)	Shinjuku	Shibuya	XX coffee shop	XY department store	
Name of cuisine	French	Japanese	Italian	Indian	
Event	Admission into a school	Graduation	Thank-you party	Contact	
Communication means	Telephone	Mail	Letter	Postcard	
Object	Book	Bag	Cup	Calculator	
Numeric_month	1-12					
Numeric_day	1-31					
Numeric_floor number	1-80					
Material of cooking	Pike conger	Tempura	Carry	Laumen	
Place (real-time)	Here	This way			
Movements	Eat	Run	Think	Write	
	

Fig.10

Word		Associated data			
		Character movement		Object	Background
		General mode	Sign language mode		
Work	1001 Construction	Mov_work_kouji	Hand_work_kouji		
	1002 Field	Mov_work_agri	Hand_work_agri		
	Desk	Mov_work_desk	Hand_work_desk		
	Tired	Mov_tired	Hand_tired		
Brow up		Mov_browup	Hand_browup		
Time				Clock_1	
XX coffee shop				Cup_1	Back_XX coffee shop
Meet [] by appointment		Mov_appointment			
Bus			Bus_1		
Paris					Back_Paris
Shinjuku					Back_Shinjuku
Laumen				Laumen	
Eat	Rice	Eat_Rice	Hand_Eat_Rice		
	Laumen	Eat_Laumen	Hand_Eat_Laumen		
	French	Eat_French	Hand_Eat_French		

Fig.11

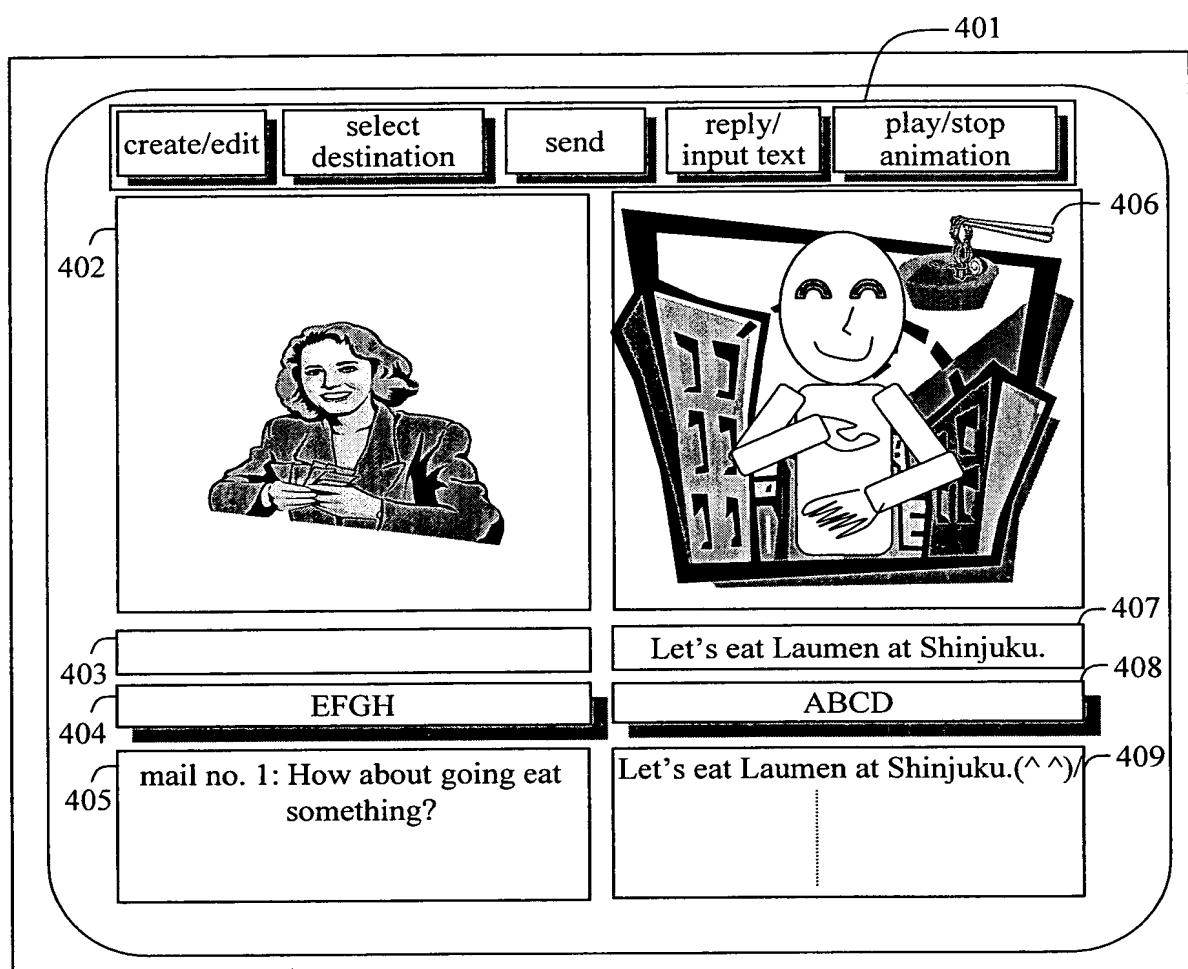


Fig.12

Positional information		Object information	Background information
Longitude	Latitude		
A0° m0'	B0° n0'	Shape_Cofeechip	Back_a XX coffee shop
A0° m1'	B0° n1'	Shape_a XX university	Back_Hachiouji
A0° m2'	B0° n2'		Back_a XX park
A0° m3'	B0° n3'	ROGO_XX shop	Back_Aoyama
A0° m4'	B0° n4'	Shape_XY building	Back_Shinjuku
A0° m5'	B0° n5'	Shape_XX building	Back_Asakusa
...
Ai° j'	Bi° nj'	Shape_effel	Back_Paris

Fig.13

number	typical text group	number of variable parts	movement pattern of typical part	slot word menu		
				variable part [1] (i = slot number) category	variable part [2]	variable part [3]
1	let's eat [] at [].	2	m_1_1 m_1_2	place	Name of cuisine/name of cooking material	Shinjuku Aoyama Ginza XY department store ... Square before Hatikoh XX coffee shop XY plaza ...
2	We'll be meeting at [].	1	m_2_1	place		
3	[] is held on [].	3	m_3_1	Numeric_month	Numeric_day	Event 1-31 1-12 1-31 Party off-line meeting ...
4	Congratulations!	1	m_4_1	Event		Birthday Admission to a school ...
5	Give me a [] when you arrived at [].	2	m_5_1	place	Event/communication means	Station Home Hakata Sado ...
6	I made a trip to [].	1	m_5_1	place		message mail ...
7	I'm waiting for you at []th floor of [].	1	m_5_1 m_5_2	place	Numeric_floor_number	Here XY department store 1-100 ...
...

Fig.14

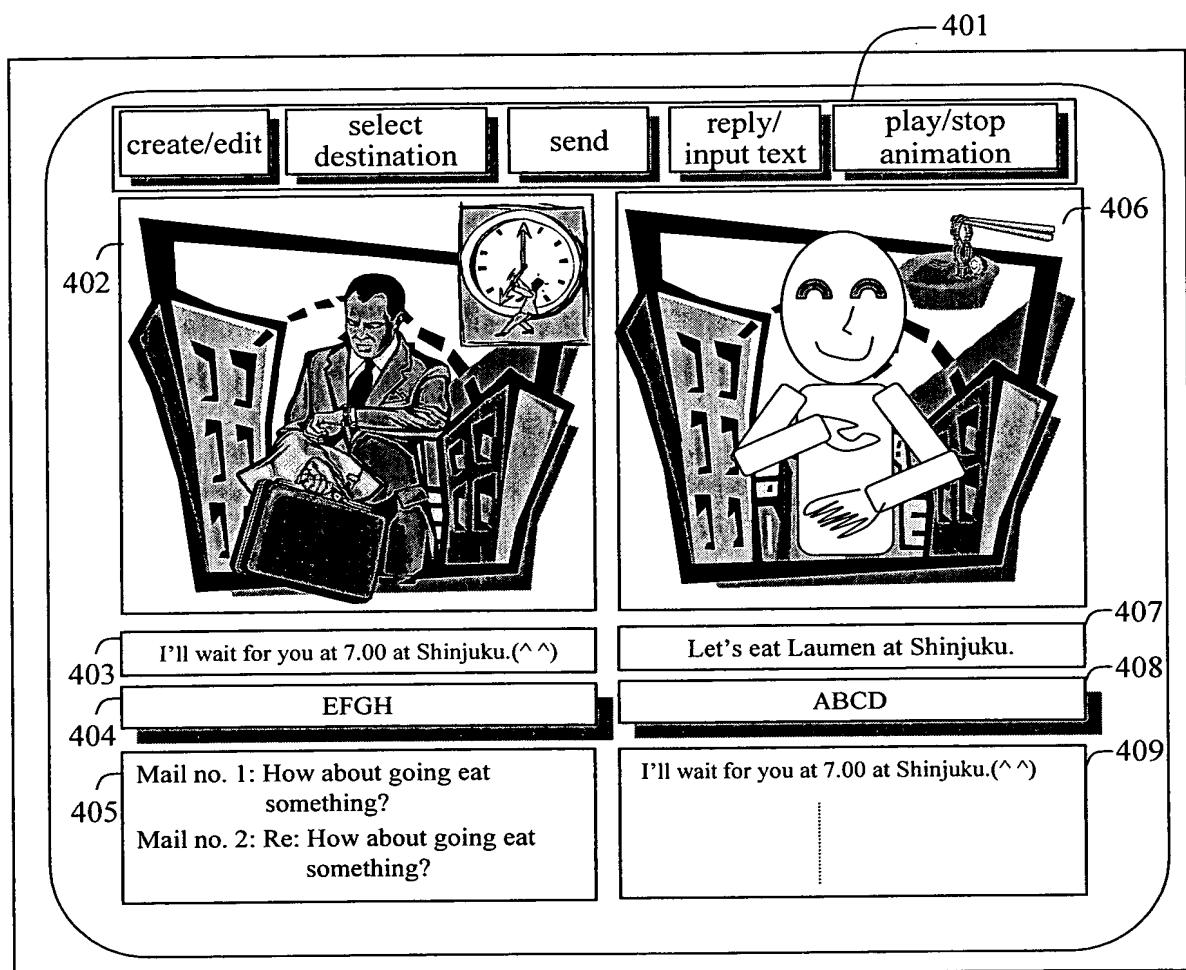


Fig.15A

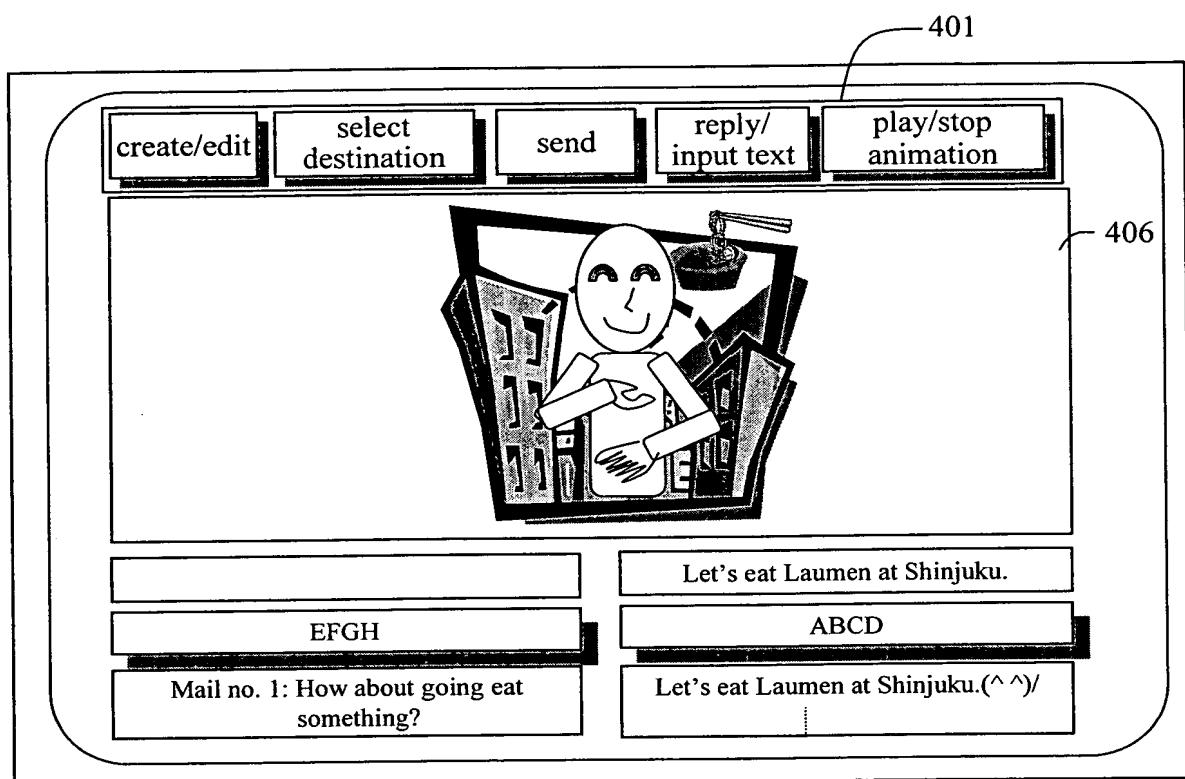


Fig.15B

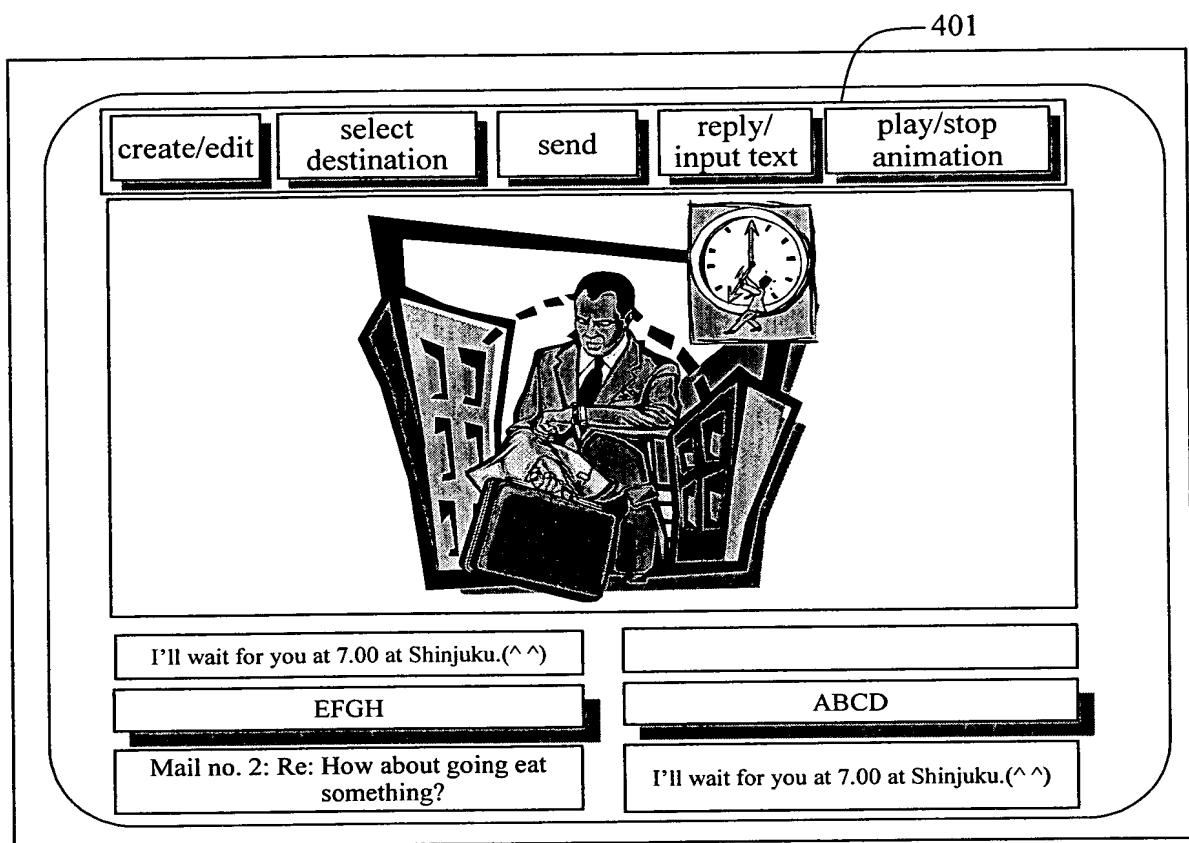


Fig.16

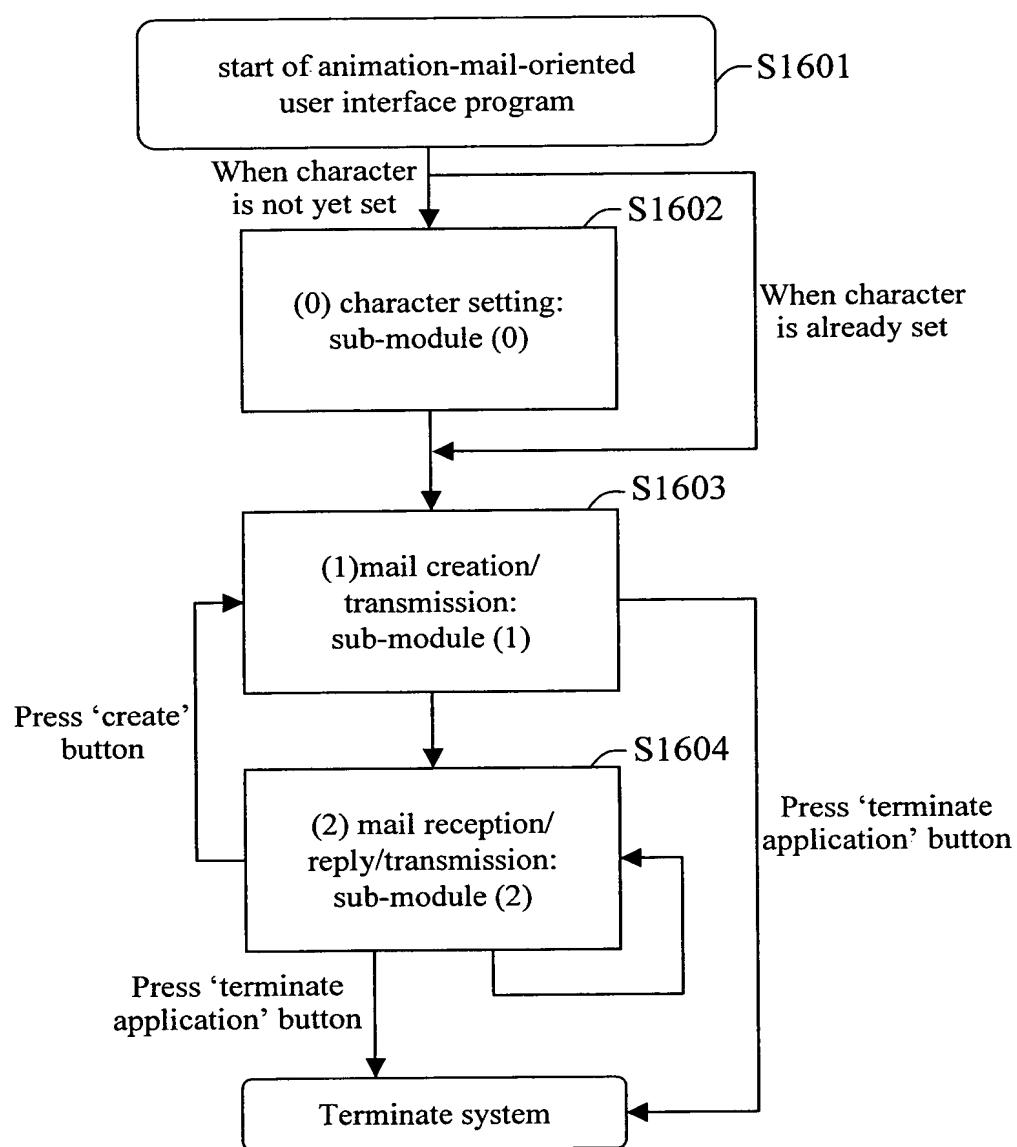


Fig.17

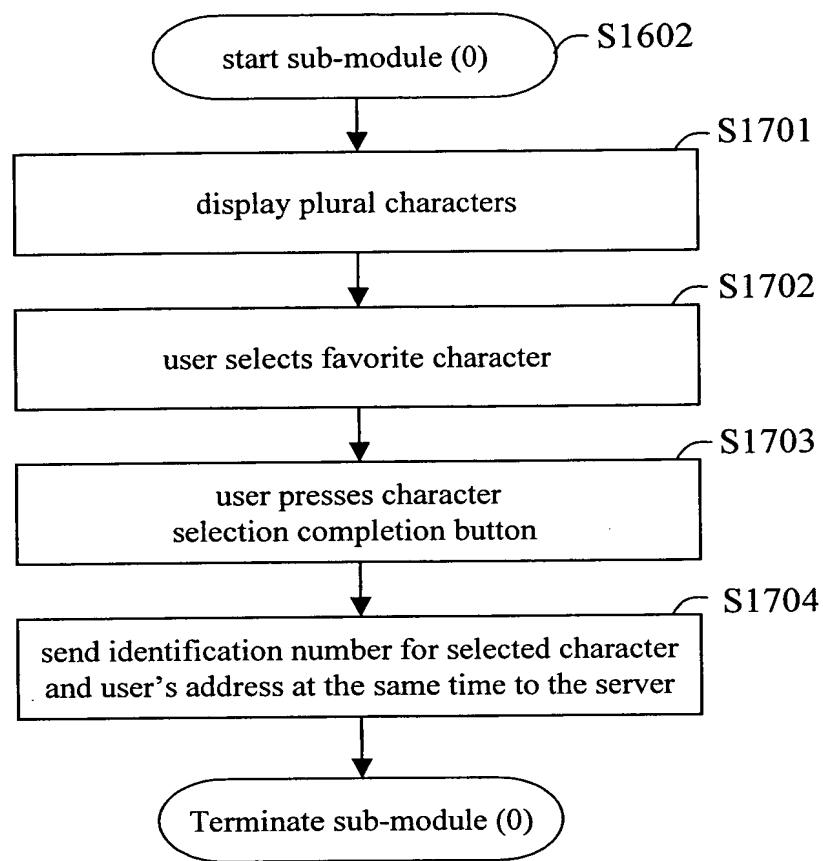


Fig.18

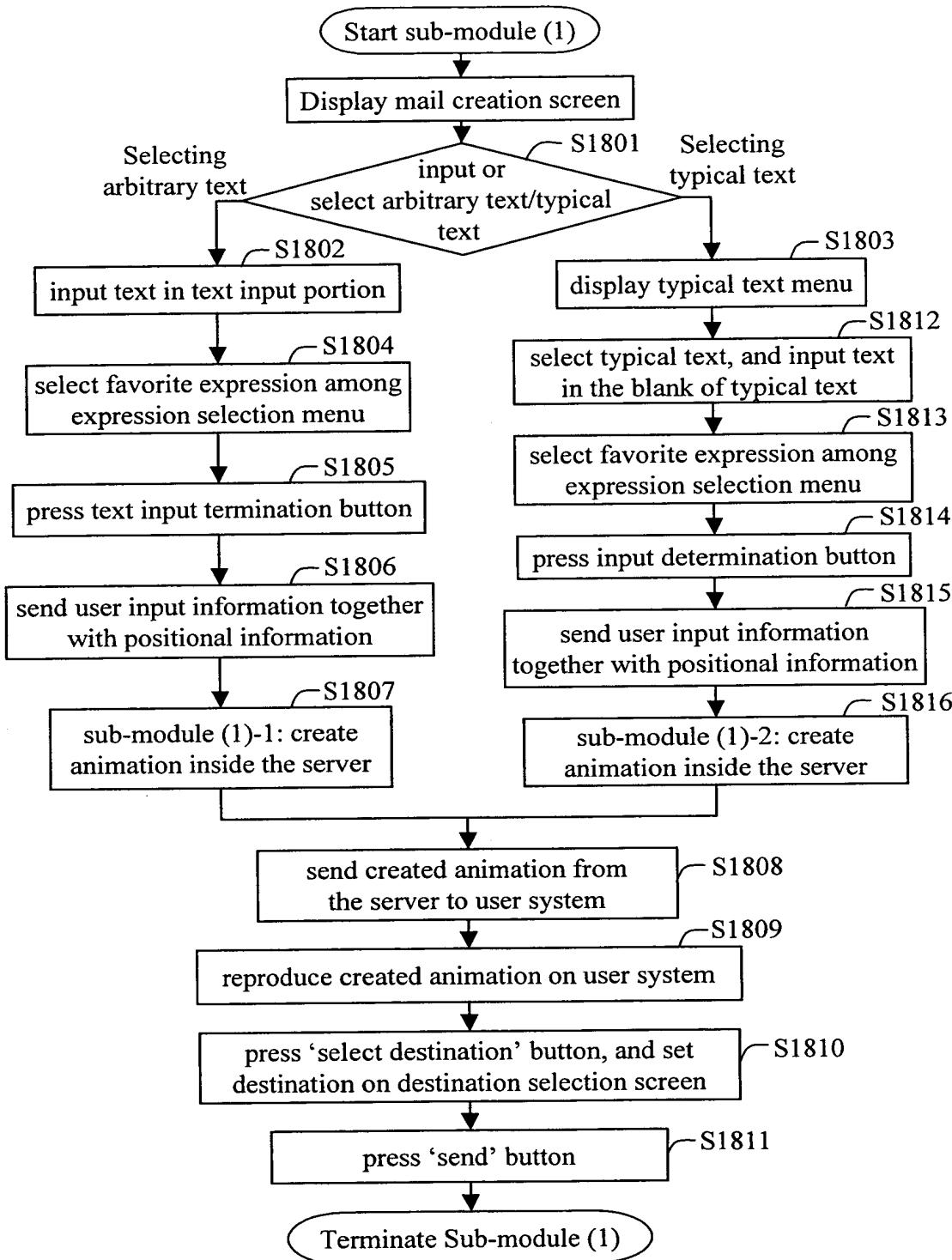


Fig.19

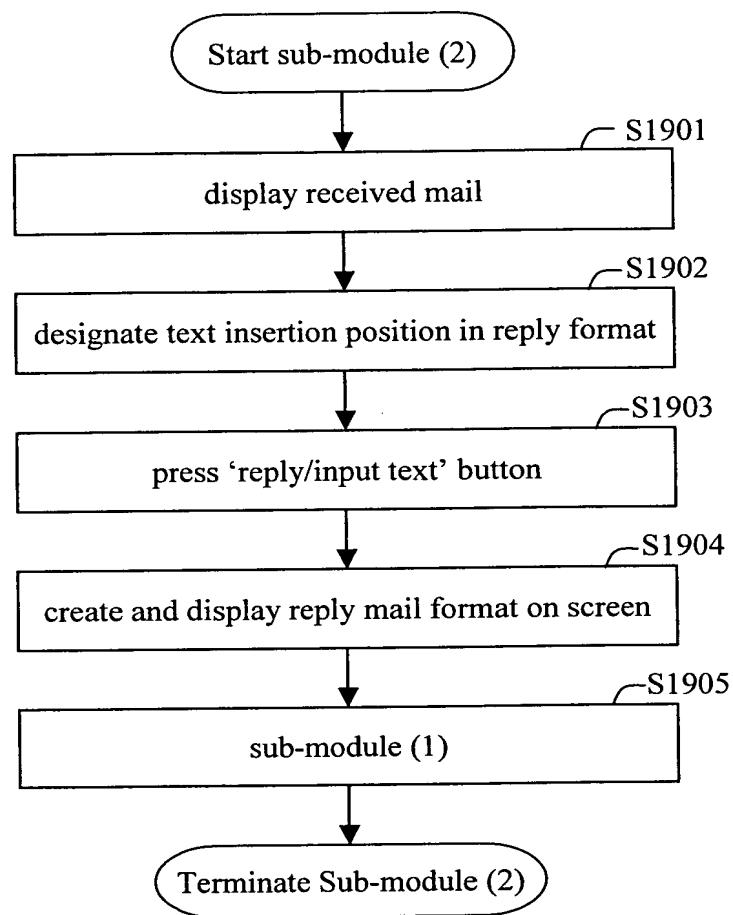


Fig.20

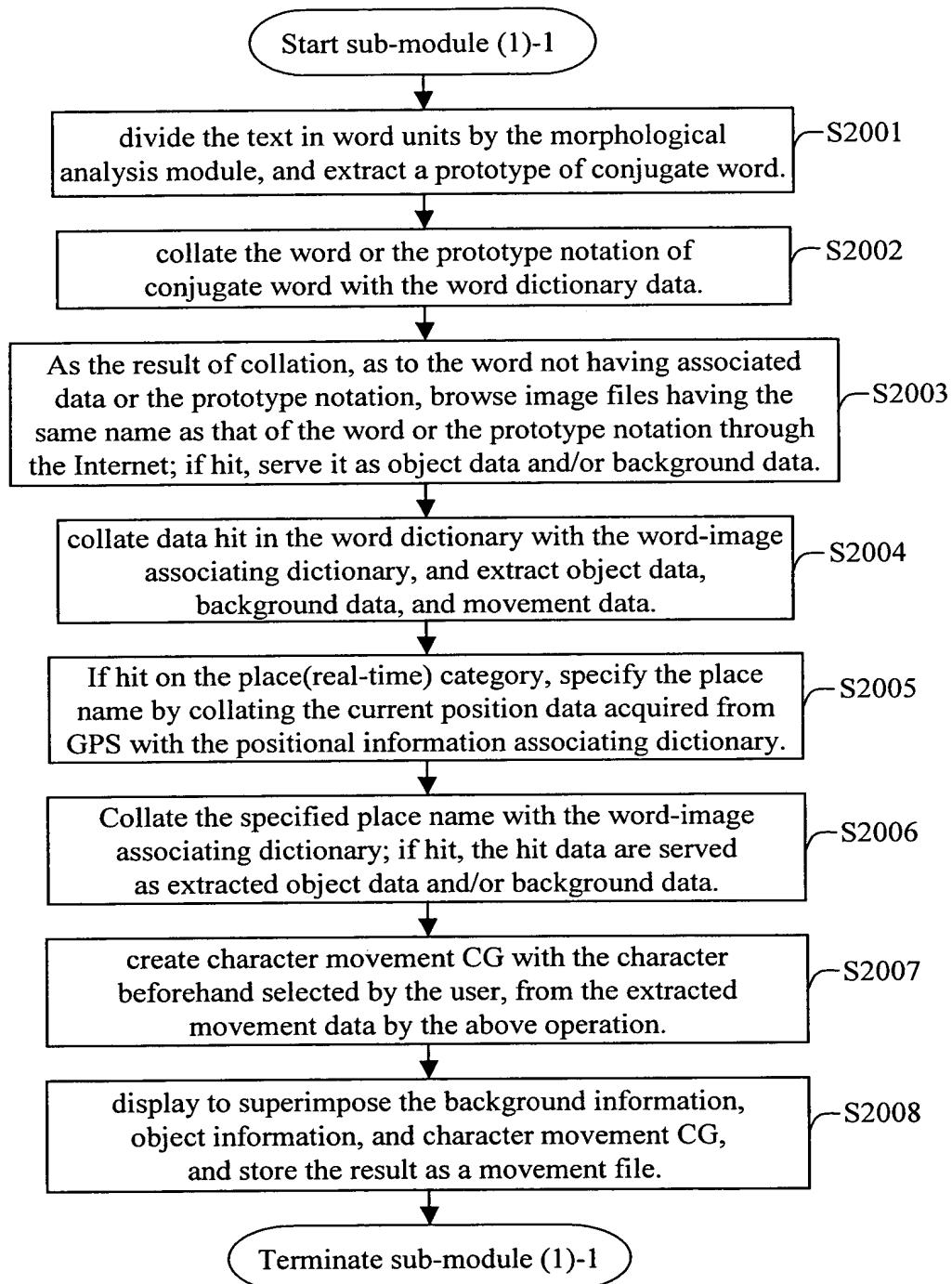


Fig.21

